UNITED STATES DEPARTMENT OF AGRICULTURE
NATURAL RESOURCES CONSERVATION SERVICE

Ecological Site Description

Site name: DRY FLAT SALINE
Site number: R-273ZY017PR
Major Land Resource Area: 273 Semiarid Coastal Plains
Interstate correlation: NONE

Physiographic features: Elevation of this site ranges from sea level to 100 ft. Most of the area is nearly level to gently slopping. Elevation increases gradually from the beaches on the Caribbean Sea to the foothills of the semiarid mountains to the north. Limestone ridges are similar to those in the Humid Coastal Plains but they lack the striking karst features. All drainage is superficial and flows in a southerly direction.

Climatic features
Frost-free period: 365 DAYS
Freeze-free period: 365 DAYS
Mean annual precipitation: 33 inches
Mean annual air temperature: 79ºF
Mean annual soil temperature:
Monthly moisture and temperature distribution:

	Mean Precipitation (inches)	**Percent Precipitation (%)**	**Mean Temperature (ºF)**
January	.78	2.36	76
February	.72	2.18	76
March	.86	2.60	77
April	1.92	5.81	78
May	2.92	8.84	80
June	3.13	9.48	81
July	2.91	8.81	82
August	4.45	13.48	82
September	5.26	15.93	81
October	5.63	17.06	81
November	3.18	9.63	79
December	1.20	3.33	77
Mean annual	**33**		**79ºF**

Other climatic features: A rainy season prevails from July to November and a pronounced dry season occurs during the remainder of the year. Hurricanes are most

likely to occur August through November, and are characterized by strong winds and torrential rains. Surface water is scarce because of limited rainfall and high evaporation rates. Low rainfall and steep topography of the adjacent semiarid mountains to the north provide little additional surface water.

Elevation Aspect: 10 to 100 ft.

Percent Slope: 0 to 2

Associated water features: Streams and rivers generally are intermittent. In places artesian pressure brings saline and sodic ground water to the surface.

Soils: Soils of this site are deep, somewhat poorly drained, fine textured (clay), alkaline to moderate salinity, slow permeability, nearly level in the dry flat saline areas. The available water holding capacity is high.

Major Soil Taxonomic Units correlated to this site include:

Aguirre, Ag
Fe, Fe
Teresa, Te
Cartagena, Ca
Guánica, Gc
Vayas, Va

Plant communities:

This site consists primarily of vegetation that is salt tolerant. The site exists in the Lajas Valley area and in the narrow zone at the edge of the mangrove forest fringing the seashore in the dry coastal plains. Forbs constitute about 70% and grasses and grasslikes about 30 % of the total vegetative composition.

Major plant species composition

There are no introduced grass species that are available for use on grazing at this time. Any disturbance of this site should be well evaluated due to the fragility of the site. Major plant species are Heliotrope and Saltwort.

GRASSES AND GRASSLIKES

Scientific Symbol	Common Name	Group	Pounds per Acre	Percent by Weight	Percent Allowed For Group
CEECH	Sotuhern sandbur	1			
PAGE5	Yerba de pantano	1			
PAMI3	Cortadora	1			
SPVI3	Beachgrass	1			

FORBS

Scientific Symbol	Common Name	Group	Pounds per Acre	Percent by Weight	Percent Allowed For group
BAMA5	Saltwort	2			
HECU3	Heliotrope	2			
PHVE	Saltweed	2			
POQU2	Chickweed	2			
SEPO2	Sea purslane	2			

Shrubs and Trees

Scientific Symbol	Common Name	Group	Pounds per Acre	Percent by Weight	Percent Allowed For group
ACFA	Acacia farnesiana	3			

Ground Cover and Structure

	Height Above the Ground											
	Not applicable		6 to 12 inches		12 to 24 inches		24 to 60 inches		60 to 80 inches		180 to 240 inches	
	% Ground cover	% Canopy cover	% Ground cover	% Canopy cover	% Ground cover	% Canopy cover	% Ground cover	% Canopy cover	% Ground cover	% Canopy cover	% Ground cover	% Canopy cover
Trees												
Shrubs												
Grasses and grasslikes					1	5						
Forbs							5	60				
Cryptogams												
Coarse fragments												
Bare ground												
Litter												

Transition Pathways:

This site is dominated by salt tolerant forbs. Low stocking pressure may support livestock year round. The major impact of overgrazing is an increase in non preferred forbs and shrubs and bare ground. The site is very fragile and disturbance is detrimental.

Total annual production: 2,500 lbs/acre

Plant Growth Curves:

Growth curve number: 001
Growth curve name: PR PLANT GROWTH CURVE
Growth curve description: Native and naturalized grasslands.

Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec
6	5	4	7	12	10	9	10	11	10	9	7

Animal Community:

This site is important for several wildlife species. Major species using the site include:

Antillean euphoina
Antillian mongo hummingbird
Balckfaced grassquit
Bananaquit
Bank swallow
Caribbean elaenia
Cattle egret
Cave swallow
Common ground dove
Common yellowthroat
Gray kingbird
Great blueheron
Greater yellowleg
Helmeted guinea fowl
Killdeer
Least grebe
Least sandpiper
Lesser antillean pewee
Morning mockingbird
Puertorican flycatcher
Puertorican vireo
Shiny cowbird
Turkey vultre
Western sandpiper
Yellowfaced grassquit
Zenaida dove
Lizards

Associated sites:

Similar sites
Plant communities, production, and vigor of this site is not similar enough to other sites in the region to cause a problem or concern.

Site documentation

Author: M. Montes, E. Más, C. Santiago
Revised: 05/2002 E. Más, J. Lugo, S. Ríos

Supporting data for site development: Supporting data include clipping studies, and historical writing of the area. More documentation and study are needed to fully understand this site and the transitions that occur.

Sampling techniques
SCS-Range 417

Type locality: Road 301, km. .9, Boqueron, Cabo Rojo, PR

Field Offices: Juana Díaz, Ponce, San Germán

References:

USDA, NRCS. 1997. National Range and Pasture Handbook.

USDA, SCS.

Site Approval:
This site has been reviewed and approved for use:

USDA NRCS Resource Conservationist Date